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MANOHARAN, MUTHUSWAMY GANAPATHY	
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Please find below and/or attached an Office communication concerning this application or proceeding.

Office Action Summary	Application No.	Applicant(s)	
	10/690,934	STOHR ET AL.	
	Examiner	Art Unit	
	Muthuswamy G. Manoharan	2687	

-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --

Period for Reply

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) OR THIRTY (30) DAYS, WHICHEVER IS LONGER, FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

Status

1)☒ Responsive to communication(s) filed on *19 December 2005*.

2a)☒ This action is **FINAL**. 2b)☐ This action is non-final.

3)☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

Disposition of Claims

4)☒ Claim(s) *1-40* is/are pending in the application.

4a) Of the above claim(s) _____ is/are withdrawn from consideration.

5)☒ Claim(s) *27* is/are allowed.

6)☒ Claim(s) *1-26 and 28-40* is/are rejected.

7)☒ Claim(s) *12 and 40* is/are objected to.

8)☐ Claim(s) _____ are subject to restriction and/or election requirement.

Application Papers

9)☐ The specification is objected to by the Examiner.

10)☐ The drawing(s) filed on _____ is/are: a)☐ accepted or b)☐ objected to by the Examiner.

Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).

Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).

11)☐ The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

Priority under 35 U.S.C. § 119

12)☐ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).

a)☐ All b)☐ Some * c)☐ None of:

1.☐ Certified copies of the priority documents have been received.

2.☐ Certified copies of the priority documents have been received in Application No. _____.

3.☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).

* See the attached detailed Office action for a list of the certified copies not received.

Attachment(s)

1) ☒ Notice of References Cited (PTO-892)
2) ☐ Notice of Draftsperson's Patent Drawing Review (PTO-948)
3) ☐ Information Disclosure Statement(s) (PTO-1449 or PTO/SB/08) Paper No(s)/Mail Date _____.
4) ☐ Interview Summary (PTO-413) Paper No(s)/Mail Date. _____.
5) ☐ Notice of Informal Patent Application (PTO-152)
6) ☐ Other: _____.

DETAILED ACTION

Response to Amendment

A new office action is found below which responds to the amendment received on December, 19, 2005.

1. Claims 1-11,13-15,17-26, and 28-39 are rejected.
2. Claim 27 is allowed.

Claim Rejections - 35 USC § 112

Claims 1-13 are rejected under 35 U.S.C. 112, first paragraph, as failing to comply with the written description requirement. The claim(s) contains subject matter, which was not described in the specification in such a way as to reasonably convey to one skilled in the relevant art that the inventor(s), at the time the application was filed, had possession of the claimed invention.

Regarding claim 1, Applicant recites, "when the orientation of the mobile communication terminal is changed, and wherein said means also instructs the controller to change the functionality of the softkey". The specification does not disclose "when the orientation of the mobile communication terminal is changed, and wherein said means also instructs the controller to change the functionality of the softkey".

The claims 2-13 dependent on the rejected claim 1 are also rejected.

Claim Rejections - 35 USC § 103

The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:

> (a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negatived by the manner in which the invention was made.

Claims 1-7 and 13 are rejected under 35 U.S.C. 103(a) as being unpatentable over Ali et al. (hereinafter Ali) (US 2003/0197679) in view of Smith (US 2002/0033836).

Regarding claim 1, Ali teaches a user interface (Figure 5) comprising: a display for showing information, a keypad including at least one soft key (Paragraph [0068], line 1; item 820 in Figure 8B), the function of the soft-key being controlled by a controller unit and being displayed as a soft label in a predetermined area of said display, and means for instructing the controller unit to change the orientation of the soft label (item 820 in Figure 8B and Figure 8C). Ali fails to teach a mobile communication terminal. However, Smith teaches a mobile communication terminal (Paragraph [0006], lines 2-3). Therefore, it would be obvious to one of ordinary skill in the art at the time of invention to make the user interface a mobile communication terminal. This modification improves the mobility of the user since it eliminates the need for long wires.

Regarding claim 2, Ali further teaches the controller unit changes the orientation of the soft label without changing the position of the predetermined area relative to the at least one soft-key (Paragraph [0070, lines 8-11).

Regarding claim 3, Ali further teaches, wherein the controller unit changes the orientation of the soft label in response to a state change of the terminal or upon a user entered command (Paragraph [0089], lines 4-10; Figure 8B and Figure 8C).

Regarding claim 4, Ali and Smith further teaches a terminal according to claim 1, wherein the controller unit changes the orientation of the soft label in response to a signal from an orientation sensor in the terminal or in response to a manually activated switch (Ali; Paragraph [0089], lines 4-10; Figure 8B and Figure 8C) (see also Smith, Paragraph [0018]).

Regarding claim 5, Ali further teaches a terminal according to claim 1, wherein the controller unit applies the same orientation changes to information on the display as to the soft label (Figure 8B and Figure 8C).

Regarding claim 6, Ali further teaches a terminal according to claim 1, wherein the soft label includes textual content (Figure 8B and Figure 8C).

Regarding claim 7, Ali and Smith further teaches a terminal according to claim 1, wherein the soft label includes graphical content (See Ali, Figure 8B and Figure 8C) (Also see Smith (Paragraph [0015], lines 15-16).

Regarding claim 13, Ali in view of Smith teaches all the particulars of the claim 1. Ali further teaches a terminal according to claim 1, wherein the keypad comprises a plurality of soft-keys, the function of each of the soft-keys being displayed by the controller unit a predetermined area in the display, the controller unit changing the orientation of the soft labels in response to user or sensor input (Figure 8B and Figure 8C, Paragraph [0066], lines 6-9).

Claims 8 and 9 are rejected under 35 U.S.C. 103(a) as being unpatentable over Smith (US 2002/0033836) in view of Morgenthaler (US 6,310,609).

Regarding claim 8, Smith teaches all the particulars of claim 1 (Figures 1-4; paragraph [0015], lines 11-17). Smith further teaches a terminal according to claim 1, wherein the keypad comprises a plurality of hard keys. Smith does not teach expressly the plurality of hard keys preferably includes a group of alphanumerical keys and/or one or more navigation keys. However, Morgenthaler teaches in an analogous art, a terminal, wherein the keypad comprises a plurality of hard keys, the plurality of hard keys preferably includes a group of alphanumerical keys and/or one or more navigation keys (Figure 1). Therefore, it would be obvious to one ordinary skill in the art at the time of invention to include wherein the keypad comprises a plurality of hard keys, the plurality of hard keys preferably includes a group of alphanumerical keys and/or one or more navigation keys. This would provide additional flexibility in activating desired operation to be performed with in the device.

Regarding claim 9, Smith teaches all the particulars of claim 1 (Figures 1-4; paragraph [0015], lines 11-17). However, Smith fails to teach a terminal according to claim 1, wherein at least one of the hard keys is provided with a hard label that can be read in at least two different orientations. However, Morgenthaler teaches in an analogous art, a terminal, wherein at least one of the hard keys is provided with a hard label that can be read in at least two different orientations (item 154 in Figure 1). Therefore, it would be obvious to one ordinary skill in the art at the time of invention to include wherein wherein at least one of the hard keys is provided with a hard label that

can be read in at least two different orientations. This would make the interface very user friendly.

Claim 10 is rejected under 35 U.S.C. 103(a) as being unpatentable over Smith (US 2002/0033836) in view of Morgenthaler (US 6,310,609) and further in view of Miano (US 2004/0045204).

Regarding claim 10, Smith in view of Morganthaler teaches all the particulars of the claim 9. Moreover, neither Smith nor Morganthaler teach, wherein the hard label is formed by a hologram. However, Miano teaches in an analogus art, wherein the hard label is formed by a hologram. Therefore, it would be obvious to one ordinary skill in the art at the time of invention to have a terminal, wherein the hard label is formed by a hologram. This label modification generates a 3D image to communicate an appearance feature, a functional feature, and/or a method of use of the product.

Claims 11 is rejected under 35 U.S.C. 103(a) as being unpatentable over Smith (US 2002/0033836) in view of Morgenthaler (US 6,310,609) and further in view of Andre (WO 98/01876)

Regarding claim 11, Smith in view of Morgenthaler teaches all the particulars of claim 9. Moreover, neither Smith nor Morgenthaler specifically teach a mobile communication terminal having a user interface, wherein the hard label is changed by changing the backlighting of the hard key concerned. However, Andre teaches in an analogous art, a mobile communication terminal having a user interface, wherein the hard label is changed by changing the backlighting of the hard key

concerned (Page 1, lines 6-7; Page 3, lines 21-31). Therefore, it would be obvious to one ordinary skill in the art at the time of invention to have a mobile communication terminal having a user interface, wherein the hard label is changed by changing the backlighting of the hard key concerned. This modification makes the key a multifunctional one.

Claims 14-17 are rejected under 35 U.S.C. 103(a) as being unpatentable over Smith (US 2002/0033836) in view of Morgenthaler (US 6,310609).

Regarding claim 14, Smith teaches a mobile communication terminal having a user interface comprising: a display for showing information, the present function of the at least one hard key being controlled by a controller unit depending on the orientation of the terminal, and that the functionality of the label is matched by the controller unit to the respective orientation dependent label and means for informing the controller unit of the orientation of the terminal (Paragraph [0018]).

Smith fails to teach a keypad including at least one hard key with a hard label that can be read in at least two different orientations and the respective orientation dependent label. However, Morganthaler teaches in an analogous art, a keypad including at least one hard key with a hard label that can be read in at least two different orientations respective orientation dependent label (item 136 in figure 1). Therefore, it would be obvious to one of ordinary skill in the art at the time invention to a keypad including at least one hard key with a hard label that can be read in at least two different orientations. This modification would make the keypad very user friendly.

Regarding claim15, Smith in view of Morganthaler teaches all the particulars of Claim 14. Smith further teaches a terminal according to claim 14, wherein the orientation of the information on the display is changed in accordance with the orientation of the terminal (Paragraph [0020], line 3-5; Figures 1-4).

Regarding claim 16, Smith in view of Logan teaches all the particulars of claim 14. Smith fails to teach wherein the hard label includes graphical content. However. Morganthaler teaches in an analogous art, wherein the hard label includes graphical content. Therefore, it would have been obvious to one of ordinary skill in the art at the time of invention to use textual content to replace graphical content. This modification provides an unambiguous answer to the information on the label.

Regarding claim 17, Smith in view of Logan teaches all the particulars of claim 14. Smith fails to teach wherein the hard label includes graphical content. However. Morganthaler teaches in an analogous art, wherein the hard label includes graphical content (item 136 in Figure 1). Therefore, it would have been obvious to one of ordinary skill in the art at the time of invention to have the hard label includes graphical content. This modification makes the keys more users friendly.

Claims 18 and 19 are rejected under 35 U.S.C. 103(a) as being unpatentable over Nuovo et al. (hereinafter Nuovo) (US 6,676,969) in view of Miano et al. (hereinafter Miano) (US 2004/0045204).

Regarding claim 18, Nuovo discloses a mobile communication terminal having a user interface comprising: a display, a keypad including keys, for showing information, at with a plurality of hard the labels of the hard keys including textual and or graphical

content relating to the function of the hard key concerned (Figure 2). Nuovo does not disclose expressly, the label of least one of the hard keys being formed by a hologram on which the textual and/or graphical content can be read in at least two different orientations. However, Miano teaches in an analogous art (labeling method), the label of least one of the hard keys being formed by a hologram on which the textual and/or graphical content can be read in at least two different orientations (Paragraph [0029], lines 4-11). Therefore, it would have been obvious to one of ordinary skill in the art at the time of invention to have the hard keys being formed by a hologram on which the textual and/or graphical content can be read in at least two different orientations. This label modification generates a 3D image to communicate an appearance feature, a functional feature, and/or a method of use of the product.

Regarding claim 19, Nuovo further teaches a mobile communication terminal according to claim 18, wherein the information on the display can be shown in different orientations (Col. 5, lines 3-11; Figure 4 and Figure 5).

Claims 20-25 are rejected under 35 U.S.C. 103(a) as being unpatentable over Morgenthaler (US 6,310,609) in view of Levy et al. (hereinafter Levi) (US 2004/0217939).

Regarding claim 20, Morganthaler teaches a mobile communication interface (figure 1) comprising: terminal having a user a display (item 202, Figure 1)for showing information, a keypad including the labels of the hard keys including textual and or graphical content relating to the function of the hard key concerned, a plurality of hard

keys (Figure 1), at least one of the hard keys being formed by an at least partially transparent key body (Abstract line 11-12) that allows objects under the key to be seen through the top of the key, the at least two labels being preferably provided with textual and/or graphical content (Figure 1) that can be read in different ordinations, whereby the substrate can be moved relative to the hard key to allow a different one of the at least two labels to be visible through the key. Mergenthaler fails to teach labels being arranged under the key on a substrate that can move relative to the key. However, Levi teaches in an analogous art, labels being arranged under the key on a substrate (Paragraph [0019], lines 1-2) that can move relative to the key. Therefore, it would have been obvious to one of ordinary skill in the art at the time of invention to have labels being arranged under the key on a substrate that can move relative to the key. This modification provides a method of changing the visual appearance of a group of keys of a keypad.

Regarding claim 21, Morganthaler in view of Levy teaches all the particulars of claim 20. Morganthaler fails to teach wherein the substrate forms part of a slidable or rotatable substrate that covers a plurality of keys so that a group of labels belonging to a plurality of keys can be moved simultaneously relative to the keys concerned. However, Levy teaches in an analogous art, wherein the substrate forms part of a slidable or rotatable substrate that covers a plurality of keys so that a group of labels belonging to a plurality of keys can be moved simultaneously relative to the keys concerned (Paragraph [0004], lines 1-12). Therefore, it would have been obvious to one of ordinary skill in the art at the time of invention to have the substrate forms part of a slidable or

rotatable substrate that covers a plurality of keys so that a group of labels belonging to a plurality of keys can be moved simultaneously relative to the keys concerned. This modification provides a method of changing the visual appearance of a group of keys of a keypad.

Regarding claim 22, Morganthaler in view of Levy teaches all the particulars of claim 21. Morganthaler fails to teach wherein a coherent group of functions for a set of keys visible in one position of the substrate, and another group of functions visible in another position of the substrate. However, Levy teaches in an analogous art, teach wherein a coherent group of functions for a set of keys visible in one position of the substrate, and another group of functions visible in another position of the substrate (Paragraph [0009], lines 1-7;Paragraph [0023], lines 17). Therefore, it would have been obvious to one of ordinary skill in the art at the time of invention to have a coherent group of functions for a set of keys visible in one position of the substrate, and another group of functions visible in another position of the substrate. This modification provides a method of changing the visual appearance of a group of keys of a keypad.

Regarding claims 23 and 24, Morganthaler in view of Levy teaches all the particulars of claim 20. Levy teaches in an analogous art, wherein substrate can move linearly/rotably relative to key or keys concerned. However, Levy teaches in an analogous art, wherein substrate can move linearly/rotably relative to key or keys concerned (Paragraph [0005], lines 1-4). Therefore, it would have been obvious to one of ordinary skill in the art at the time of invention to wherein substrate can move

linearly/rotably relative to key or keys concerned. This modification provides a method of changing the visual appearance of a group of keys of a keypad.

Regarding claim 25, Morganthaler in view of Levy teaches all the particulars of claim 21. Morganthaler fails to teach, wherein the substrate is user exchangeable and provided with means allowing the mobile terminal to identify the substrate. However, Levy teaches in an analogous art, wherein the substrate is user exchangeable and provided with means allowing the mobile terminal to identify the substrate (Paragraph [0027], lines 3-10). Therefore, it would have been obvious to one of ordinary skill in the art at the time of invention to wherein substrate can move linearly/rotably relative to key or keys concerned. This modification provides a method of changing the visual appearance of a group of keys of a keypad.

Claim 26 is rejected under 35 U.S.C. 103(a) as being unpatentable over Bar-Yona (US 6805506) in view of Smith (US 2002/0033836).

Regarding claim 26, Bar-Yona teaches a mobile communication terminal (Figure 14) having a user interface comprising: a display for showing information (Figure 14), a keypad (Col. 4, line 15) including a plurality of hard keys, the labels of the hard keys (Figure 14), keys including textual and or graphical content (Figure 2) relating to the function of the hard key concerned, at least one of the hard keys comprises a lenticular screen (Col. 3, line 28) with at least two interlaced labels there behind, wherein one the at least two labels being visible and readable in a first orientation and the other of the label being visible in a different orientation of the mobile communication terminal, (Col. 3, lines 3-6; Figure 3C), and further wherein the information shown on the display is

reversed in orientation when the orientation of the mobile communication terminal is reversed. Bar-Yona did not teach expressly wherein the information shown on the display is reversed in orientation when the orientation of the mobile communication terminal is reversed. However, Smith teaches in an analogous art, wherein the information shown on the display is reversed in orientation when the orientation of the mobile communication terminal is reversed (Paragraph [0018]; Paragraph [0020], lines 4-6). Therefore, it would be obvious to one of ordinary skill in the art at the time of invention to have a mobile terminal wherein the information shown on the display is reversed in orientation when the orientation of the mobile communication terminal is reversed. This modification makes the interface user friendly.

Claim 28 is rejected under 35 U.S.C. 103(a) as being unpatentable over Nuovo et al. (hereinafter Nuovo) (US 6,676,969) in view of Ostergard et al. (hereinafter Ostergard) (US 6,926,418).

Regarding claim 28, Nuovo teaches a mobile communication terminal having a user interface comprising: a display for showing information (item 54 in Figure 2), a keypad including a plurality of hard keys arranged in a substantially circular pattern (item 56 in Figure 2), the labels of the hard keys including textual and or graphical content (items 64,66 in Figure 2) relating to the function of the hard key concerned (Figure 2), the hard keys being formed by an at least partially transparent key body that allows objects under the key to be seen through the top of the key, the labels of the hard keys being arranged in a substantial circular pattern that matches the circular

pattern in which the hard keys are arranged. Nuovo fails to teach the hard keys being formed by an at least partially transparent key body that allows objects under the key to be seen through the top of the key, the labels of the hard keys being arranged on a substrate. However, Ostergard teaches in an analogous art, the hard keys being formed by an at least partially transparent key body that allows objects under the key to be seen through the top of the key (Col. 2, lines 64-67; Col. 6, lines 63-65), the labels of the hard keys being arranged on a substrate (Col. 5, lines 1-6). Therefore, it would have been obvious to one ordinary skill in the art at the time of invention to have the hard keys being formed by an at least partially transparent key body that allows objects under the key to be seen through the top of the key, the labels of the hard keys being arranged on a substrate. This modification provides a keyboard illumination system where the light guide and user-interface are integrated.

Claim 29 is rejected under 35 U.S.C. 103(a) as being unpatentable over Logan et al. (hereinafter Logan) (US 6,816,577) in view of Ali et al. (hereinafter Ali) (US 2003/0197679).

Regarding claim 29, Logan teaches a mobile communication terminal (Figure 2) having a user interface comprising: a display (Figure 2), a confirming key (move the cursor to the label yes and press the key √ in Figure 2) and a rejection key (move the cursor to the label no and press the key √ **in** Figure 2), a function to be confirmed or to

be rejected being controlled by a controller unit and being displayed in a predetermined area of said display (Col. 4, lines 1-10). Logan fails to teach means for instructing the controller unit to change the orientation in which the function is displayed when the orientation of the mobile communication terminal is changed. However, Ali teaches in an analogous art (user interface), the means for instructing the controller unit to change the orientation in which the function is displayed when the orientation of the mobile communication terminal is changed (item 820 in Figure 8B and Figure 8C). Therefore, it would haven obvious to one of ordinary skill in the art at the time invention to provide the means for instructing the controller unit to change the orientation in which the function is displayed. This modification provides the user with a flexibility to adjust the viewing area of the display unit.

Regarding claim 30, Logan in view of Ali teaches all the particulars of the claim 29. Logan fails to teach a terminal according to claim 29, wherein the controller unit changes the orientation of the function to be confirmed or to be rejected without changing the position of the predetermined area relative to the confirming key and rejection key. However, Ali teaches in an analogous art (user interface), a terminal according to claim 29, wherein the controller unit changes the orientation of the function to be confirmed or to be rejected without changing the position of the predetermined area relative to the confirming key and rejection key (item 820 in Figure 8B and Figure 8C). Therefore, it would haven obvious to one of ordinary skill in the art at the time invention to have a terminal according to claim 29, wherein the controller unit changes the orientation of the function to be confirmed or to be rejected without changing the

position of the predetermined area relative to the confirming key and rejection key. This modification provides the user with a flexibility to adjust the viewing area of the display unit.

Regarding claim 31, Logan in view of Ali teaches all the particulars of the claim 29. Logan fails to teach a terminal according to claim 29, wherein the controller unit changes the orientation of the function to be confirmed or to be rejected in response to a state change of the terminal or upon a user entered command. However, Ali teaches in an analogous art, wherein the controller unit changes the orientation of the function to be confirmed or to be rejected in response to a state change of the terminal or upon a user entered command (Paragraph [0066], lines 4-11; Figure 8B and Figure 8C). Therefore, it would haven obvious to one of ordinary skill in the art at the time invention to have the controller unit changes the orientation of the function to be confirmed or to be rejected in response to a state change of the terminal or upon a user entered command. This modification provides the user with a flexibility to adjust the viewing area of the display unit.

Regarding claim 32, Logan in view of Ali teaches all the particulars of the claim 29. Logan fails to teach a terminal according to claim 29, wherein the controller unit changes the orientation of the function to be confirmed or to be rejected in response to a signal from an orientation sensor in the terminal or in response to a manually activated switch. However, Ali teaches in an analogous art, wherein the controller unit changes the orientation of the function to be confirmed or to be rejected in response to a signal from an orientation sensor in the terminal or in response to a manually

activated switch (Paragraph [0066], lines 4-11; Paragraph [0070], lines 8-11; Figure 8B and Figure 8C). Therefore, it would haven obvious to one of ordinary skill in the art at the time invention to have the controller unit changes the orientation of the function to be confirmed or to be rejected in response to a signal from an orientation sensor in the terminal or in response to a manually activated switch. This modification provides the user with a flexibility to adjust the viewing area of the display unit.

Regarding claim 33, Logan in view of Ali teaches all the particulars of the claim 29. Logan fails to teach a terminal according to claim 29, wherein the controller unit applies the same orientation changes to information on the display as to the function to be confirmed or to be rejected. However, Ali teaches in an analogous art, wherein the controller unit applies the same orientation changes to information on the display as to the function to be confirmed or to be rejected (Figure 8B and Figure 8C). Therefore, it would haven obvious to one of ordinary skill in the art at the time invention to have the controller unit applies the same orientation changes to information on the display as to the function to be confirmed or to be rejected. This modification provides the user with a flexibility to adjust the viewing area of the display unit.

Regarding claim 34, Logan in view of Ali teaches all the particulars of the claim 29. Ali further teaches a terminal according to claim 29, wherein the function to be confirmed or to be rejected is represented by textual content (Figure 2).

Regarding claim 35, Logan in view of Ali teaches all the particulars of the claim 29. Logan fails to teach a terminal according to claim 29, wherein the function to be confirmed or to be rejected is represented by graphical content. However, Ali teaches in

an analogous art, a terminal according to claim 29, wherein the function to be confirmed or to be rejected is represented by graphical content (item 820 in Figure 8B and Figure 8C; Paragraph [0068], line 7). Therefore, it would haven obvious to one of ordinary skill in the art at the time invention to have a terminal according to claim 29, wherein the function to be confirmed or to be rejected is represented by graphical content. This modification makes the interface efficient and convenient.

Regarding claim 36, Logan in view of Ali teaches all the particulars of the claim 29. Logan further teaches a terminal according to claim 29, wherein the keypad comprises a plurality of hard keys, the plurality of hard keys preferably includes a group of alphanumerical keys and/or one or more navigation keys (Figure 2).

Regarding claim 37, Logan teaches a terminal according to claim 29, wherein at least one of the hard keys is provided with a hard label (Figure 2) that can be read in at least two different orientations.

Claim 38 is rejected under 35 U.S.C. 103(a) as being unpatentable over Logan in view of Ali and further in view of Miano (hereinafter Miano) (US 2004/0045204).

Regarding claim 38, Logan in view of Ali teaches all the particulars of the claim 38 except wherein the hard label is formed by a hologram. However, Miano teaches in an analogous art (labeling method), the hard label is formed by a hologram (Paragraph [0029], lines 4-11). Therefore, it would haven obvious to one of ordinary skill in the art at the time invention to have the hard label is formed by a hologram. This label

modification generates a 3D image to communicate an appearance feature, a functional feature, and/or a method of use of the product.

Regarding claim 39, Logan in view of Miano teaches all the particulars of claim 38. Logan fails to teach a terminal, wherein the hard label is changed by changing the back lighting of the hard key concerned. However, Miano teaches in an analogous art, the hard label is changed by changing the backlighting of the hard key concerned (Paragraph [0042], lines 13-18). Therefore, it would haven obvious to one of ordinary skill in the art at the time invention to have the hard label is changed by changing the backlighting of the hard key concerned. This modification improves the viewing experience.

Claim 29-37 are rejected under 35 U.S.C. 103(a) as being unpatentable over Swerup et al. (hereinafter Swerup) (US 2002/0177464) in view of Ali et al. (hereinafter Ali) (US 2003/0197679).

Regarding claim 29, Swerup teaches a mobile communication terminal (Figure 2) having a user interface comprising: a display (Figure 2), a function confirming key (key with label "y" in Figure 2) and a function rejection key (key with label "N" in Figure 2), a function to be confirmed or to be rejected being controlled by a controller unit and being displayed in a predetermined area of said display (Paragraph [0025], lines 9-10) when the orientation of the key pad is changed (Paragraph [0010], lines 4-9; Paragraph [0022], lines 6-13; Figures 1-5).

Swerup fails to teach means for instructing the controller unit to change the orientation in which the function is displayed when the orientation of the mobile

communication terminal is changed. However, Ali teaches in an analogous art (user interface), the means for instructing the controller unit to change the orientation in which the function is displayed when the orientation of the mobile communication terminal is changed (item 820 in Figure 8B and Figure 8C). Therefore, it would haven obvious to one of ordinary skill in the art at the time invention to provide the means for instructing the controller unit to change the orientation in which the function is displayed when the orientation of the mobile communication terminal is changed. This modification provides the user with a flexibility to adjust the viewing area of the display unit.

Regarding claim 30, Swerup teaches, wherein the controller unit changes the orientation of the function to be confirmed or to be rejected without changing the position of the predetermined area relative to the confirming key and rejection key (Figure 3).

Regarding claim 31, Swerup, wherein the controller unit changes the orientation of the function to be confirmed or to be rejected in response to a state change of the terminal or upon a user entered command. However, Ali teaches in an analogous art, wherein the controller unit changes the orientation of the function to be confirmed or to be rejected in response to a state change of the terminal or upon a user entered command (Paragraph [0022], lines 6-13).

Regarding claim 32, Swerup teaches, wherein the controller unit changes the orientation of the function to be confirmed or to be rejected in response to a signal from an orientation sensor in the terminal or in response to a manually activated switch ("detector unit", Paragraph [0022], lines 6-13).

Regarding claim 33, Swerup teaches a terminal according to claim 29, wherein the controller unit applies the same orientation changes to information on the display as to the function to be confirmed or to be rejected (Figures 2 and 3).

Regarding claim 34, Swerup teaches terminal according to claim 29, wherein the function to be confirmed or to be rejected is represented by textual content (Figure 2).

Regarding claim 35, Swerup teaches terminal according to claim 29, wherein the function to be confirmed or to be rejected is represented by graphical content (Figure 2).

Regarding claim 35, Swerup teaches a terminal according to claim 29, wherein the keypad comprises a plurality of hard keys, the plurality of hard keys preferably includes a group of alphanumerical keys and/or one or more navigation keys (Figure 2).

Regarding claim 37, Logan teaches a terminal according to claim 29, wherein at least one of the hard keys is provided with a hard label ("*", Figure 2) that can be read in at least two different orientations.

Claims 38-39 are rejected under 35 U.S.C. 103(a) as being unpatentable over Swerup et al. (hereinafter Swerup) (US 2002/0177464) in view of Ali et al. (hereinafter Ali) (US 2003/0197679) and further in view of Miano (hereinafter Miano) (US 2004/0045204).

Regarding claim 38, Swerup in view of Ali teaches all the particulars of the claim except wherein the hard label is formed by a hologram. However, Miano teaches in an analogous art (labeling method), the hard label is formed by a hologram (Paragraph [0029], lines 4-11). Therefore, it would haven obvious to one of ordinary skill in the art at the time invention to have the hard label is formed by a hologram. This label

modification generates a 3D image to communicate an appearance feature, a functional feature, and/or a method of use of the product.

Regarding claim 39, Swerup in view of Ali and further in view of Miano teaches all the particulars of claim 38. Neither Swerup nor Ali teaches a terminal, wherein the hard label is changed by changing the back lighting of the hard key concerned. However, Miano teaches in an analogous art, the hard label is changed by changing the backlighting of the hard key concerned (Paragraph [0042], lines 13-18). Therefore, it would haven obvious to one of ordinary skill in the art at the time invention to have the hard label is changed by changing the backlighting of the hard key concerned. This modification improves the viewing experience.

Response to Arguments

Applicant's arguments regarding claims 1-11 (page 13-14) have been fully considered but they are not persuasive.

Examiner respectfully disagrees with Applicant's assertion on Page 13 of the remarks, "it does not teach soft keys that are viewable in different orientations and whose function is adjusted depending on orientation". As discussed above (112, First paragraph rejection) this part of argument is not supported by the specification. Specification does not teach soft keys that are viewable in different orientations and whose function is adjusted depending on orientation.

Examiner respectfully disagrees with Applicant's assertion on Page 14 of the remarks, "there is no teaching of keys that are readable in different orientations". The

key as pointed out in reference as item 154 in Figure 1 can be readable in any orientation.

Examiner respectfully disagrees with Applicant's assertion on Page 14 of the remarks, "it is not plausible that such a device be incorporated into a mobile communication terminal". Morganthaler teachings regarding holographic label can be used to make hard label for the keys.

Applicant's argument regarding claims 11 and 12 is not applicable to claim 11, since claim 11 does not say anything about rotating a polarized film.

Applicant's argument regarding claim 12 is persuasive. However, it is dependent on a rejected claim 11.

Examiner respectfully disagrees with Applicant's assertion on Page 17 of the remarks, "there is no substrate on which labels are presented". Examiner would like to point out one of the meanings of substrate in this regard. **Substrate** is a term used, to describe the base material that images will be printed onto. These materials include (though are not limited to) films, foils, textiles, fabrics, plastics, and any variety of paper (lightweight, heavyweight, coated, uncoated, paperboard, cardboard etc.).

Examiner respectfully disagrees with Applicant's assertion on Page 17 of the remarks," transparent body of Ostergard will have nothing to view". Ostergard teaches the light illuminate the key buttons (Abstract, lines 7-8; Col. 6, lines 63-64) and therefore, one can view the key buttons and the labels.

Examiner respectfully disagrees with Applicant's assertion on Page 16 of the remarks, " there is nothing to indicate that any keys are readable in different orientations

or the function of the soft keys are adjusted depending on the orientation". Neither the specification nor the claim teaches the function of the soft keys is adjusted depending on the orientation.

Examiner respectfully disagrees with Applicant's assertion on Page 17 of the remarks," This is not a substrate, according to the claims of this application". Applicant is reading limitations of the specification into the claim. Examiner interprets the claim limitation by giving it the broadest reasonable interpretation.

Allowable Subject Matter

1. Claim 27 is allowed.

2. Claim 12 and 40 are objected to as being dependent upon a rejected claim, but would be allowable if rewritten in independent form including all of the limitations of the base claim and any intervening claims.

These claims recite novel material not found, either alone or in combination, in the prior art of record.

Conclusion

Applicant's amendment necessitated the new ground(s) of rejection presented in this Office action. Accordingly, **THIS ACTION IS MADE FINAL**. See MPEP § 706.07(a). Applicant is reminded of the extension of time policy as set forth in 37 CFR 1.136(a).

A shortened statutory period for reply to this final action is set to expire THREE MONTHS from the mailing date of this action. In the event a first reply is filed within TWO MONTHS of the mailing date of this final action and the advisory action is not

mailed until after the end of the THREE-MONTH shortened statutory period, then the shortened statutory period will expire on the date the advisory action is mailed, and any extension fee pursuant to 37 CFR 1.136(a) will be calculated from the mailing date of the advisory action. In no event, however, will the statutory period for reply expire later than SIX MONTHS from the date of this final action.

Any inquiry concerning this communication or earlier communications from the examiner should be directed to Muthuswamy G. Manoharan whose telephone number is 571-272-5515. The examiner can normally be reached on 7:30AM-4:30PM.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Lester Kincaid can be reached on 571-272-7922. The fax phone number for the organization where this application or proceeding is assigned is 571-273-8300.

Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see http://pair-direct.uspto.gov. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free).

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